Symposium Title: Innovative Psychological Interventions for Mental Health in People with Intellectual Disability or Autism: Moving Beyond Anxiety

Chair: Jonathan A. Weiss

Discussant: Richard Hastings

Overview: It is well known that people with intellectual disabilities and with autism experience high rates of associated mental health problems. Approximately 40% to 70% of people with these developmental disabilities will have clinically significant emotional or behavioral problems (Totsika, Hastings, Emerson, Lancaster, & Berridge, 2011), and higher rates of associated psychiatric diagnoses are found compared to the general population (Emerson, 2003; Weiss et al., 2017). While there has been considerable research on cognitive behavior therapy to address anxiety in people with autism (Weston, Hodgekins, & Langdon, 2016), a relative dearth exists in expanding cognitive and behavioral interventions to address other common emotional problems, such as depression, or emotion regulation more broadly, or to individuals with intellectual disabilities. The majority of the evidence has also involved children. The three presentations in this symposium focus on novel interventions that were developed to address mental health outcomes beyond anxiety specifically, collectively spanning age groups, intervention frameworks, and targets. The first presentation will describe results from a randomized controlled trial of cognitive behavior therapy to improve emotion regulation and psychopathology in children with autism. The second presentation will focus on the use of mindfulness-based therapy to improve emotion regulation in adolescents with autism. The third presentation employs a randomized controlled trial to compare the use of behavioral activation and of guided self-help to address depression in adults with intellectual disabilities. Together, these studies add to our knowledge of how psychological interventions can be used to address a broad array of mental health problems in people with developmental disabilities.

References/Citations:


Paper 1 of 3

Paper Title: Cognitive Behavior Therapy to Improve Emotion Regulation and Reduce Psychopathology in Children with Autism Spectrum Disorder

Authors: Jonathan A. Weiss, Kendra Thomson, Priscilla Burnham Riosa, Carly Albaum, Victoria Chan, Andrea Maughan, Paula Tablon & Karen Black

1 York University
2 University of Warwick
3 York University
Introduction: Many children with autism spectrum disorder (ASD) without intellectual disability have clinically significant emotional difficulties (Totsika et al. 2011). Cognitive behavior therapy (CBT) is considered an efficacious treatment for anxiety in children with ASD (Weston, Hodgekins, & Langdon, 2016), although more work is needed to clarify whether treatment benefits extend beyond improvement of anxiety symptoms, to improvement of adaptive emotion regulation abilities across multiple co-morbidities (Ehrenreich-May et al., 2017). The current study employed a randomized waitlist controlled trial to evaluate the efficacy of CBT to improve emotion regulation and reduce mental health problems in this population. The Secret Agent Society: Operation Regulation (SAS:OR) is an individually provided spy-themed manualized intervention using systemic exposures, affect education, and strategies applied across multiple emotions with a focus on practicing adaptive emotion regulation processes. A parent is involved throughout each session; they follow along in their own manual, provide support to the child and therapist and help the child transfer skills to school and home environments.

Methods: Sixty-eight children with ASD (M age = 9.75, SD = 1.27; IQ > 79) and their parents participated in the study. Families were randomly allocated to either a treatment immediate (n = 35) or waitlist control condition (n = 33). Primary and secondary outcomes were assessed via parent-report (Emotion Regulation Checklist; Emotion Regulation and Social Skills Questionnaire; Anxiety Disorder Interview Schedule; Behavior Assessment System for Children – 2nd Edition), and child-report (Children’s Emotion Management Scales; Dylan is Being Teased; James and the Maths Test), along with blind clinician judgement of the parent-reported information. Measures were administered at baseline, post-intervention, and at 10-week follow-up.

Results: Results from the intent-to-treat analysis revealed a significant treatment effect on two primary emotion regulation outcome measures: The parent-report Lability/Negativity subscale of the Emotion Regulation Checklist (p = .04), with a medium effect, and the Emotion Regulation and Social Skills Questionnaire (p < .01), with a large effect. Significant medium to large treatment effects were also found for parent reports of child adaptive behavior (p < .01) and behavioral symptoms (p = .04), and for blind clinician judgement on the Clinical Global Impression Scale-Severity (p = .02), and -Improvement (p = .03), reflecting a reduction in overall psychopathology. The degree of parent-reported improvement in child emotion regulation was associated with improvements in adaptive behavior (r = .34, p = .01) and behavioral symptoms of psychopathology (r = -.34, p = .01). No treatment effects were found according to child-report measures. Treatment gains were maintained at follow-up.

Discussion: This study is among the first to document changes in emotion regulation in children with ASD using CBT. Additional investigations are needed to further establish the relative efficacy of this transdiagnostic program compared to anxiety-specific models of CBT.

References/Citations:


1 Brock University
Paper 2 of 3

Paper Title: Targeting Improved Emotion Regulation as a Transdiagnostic Treatment Approach to Psychiatric and Behavioral Concerns in Adolescents with Autism Spectrum Disorder

Authors: Caitlin M. Conner¹, Kelly B. Beck², Susan W. White³, Carla A. Mazefsky¹

Introduction: Although adolescents with autism spectrum disorder (ASD) commonly have complex comorbid symptom presentations, including combinations of depression, anxiety, and problem behavior, the majority of the psychosocial intervention research in ASD has focused solely on anxiety. One way to have a broader and more sustained clinical impact is to focus on core processes that underlie a range of problems. A growing body of research suggests that impaired emotion regulation may underlie many of the co-occurring psychiatric and behavioral problems seen in ASD (Weiss et al., 2017). Thus, the Emotion Awareness and Skills Enhancement (EASE) program was developed to target emotion regulation impairment by improving emotional awareness with mindfulness practices and teaching skills to manage intense and negative emotions. We sought to examine whether pre-treatment level of comorbid symptoms (depression, anxiety, and irritability) affected reduction of emotion regulation impairment.

Methods: In a pilot, two-site open trial, 20 adolescents, ages 12-17 years old, with a confirmed diagnosis of ASD and IQ > 80 participated in 16 individual therapy sessions. Multi-method data (behavioral testing, clinician-, parent-, and self-report) were collected at pre- and post-treatment. Preliminary analyses included data from 11 participants (the remainder are nearing treatment completion). Effect sizes (Cohen’s d) were calculated for improvement in emotion regulation, psychiatric symptoms, and problem behaviors. Partial correlations were conducted to examine the association between pre-treatment symptoms and post-treatment emotion regulation impairment, controlling for baseline emotion regulation impairment.

Results: Moderate to large effect sizes were observed for post-treatment improvement in emotion regulation (d = 0.73), psychiatric symptoms (depression d = 0.88, anxiety d = 0.41), and problem behavior (d = 0.79). Degree of pre-treatment depression, anxiety, and irritability was not significantly correlated with post treatment emotion dysregulation (all r > .063, p > .114). Further analyses will examine these associations in the full sample.

Discussion: A mindfulness-based intervention decreased emotion regulation impairment and psychiatric symptom severity with moderate to large effect sizes among adolescents with ASD. Pre-treatment anxiety, depression, and irritability levels were not differentially associated with changes in post-treatment emotion regulation impairment, which supports the feasibility of a transdiagnostic, target engagement approach to treatment of a broad range of psychiatric symptoms in ASD.

References/Citations:

Paper 3 of 3

Paper Title: Comparing a Behavioural Activation Treatment for Depression in Adults with Intellectual Disabilities with Guided Self-Help: A Randomised Controlled Trial

Authors: Andrew Jahoda¹, Craig Meville¹, Richard Hastings², Sally-Ann Cooper¹, Dave Dagnan³ & Beatit Research Team

¹University of Pittsburgh School of Medicine
²University of Pittsburgh School of Health and Rehabilitation Sciences
³Virginia Tech, Department of Psychology
**Introduction:** Depression is at least as common in adults with an intellectual disability as in the general population. In 2016, the National Institute for Health and Care Excellence identified that the only available evidence on psychological interventions for depression in people with an intellectual disability was for adapted cognitive behavioural therapy (CBT). However, it was of very low quality. Behavioural activation has been shown to be at least as efficacious as antidepressant medications, and superior or non-inferior to CBT, pill-placebo, and treatment as usual in the general population. Behavioural activation may be more accessible than CBT for people with intellectual disabilities as it focuses on behaviour more than cognition, and is less reliant on expressive and receptive communicative abilities. The emphasis is on increasing engagement with potential environmental reinforcers.

**Methods:** A multi-centre single-blind randomised controlled trial, with follow-up at four, eight and 12 months post-randomisation was used to examine the clinical effectiveness of manualised adapted Behavioural Activation (BeatIt) compared with a guided self-help intervention (StepUp). There was a nested qualitative study. Participants were recruited from specialist community services for people with intellectual disabilities across the UK. Participants were aged over 18 years, had clinically significant depression (using the Diagnostic Criteria for Psychiatric Disorders for Adults with Learning Disabilities), could provide informed consent and had a supporter to accompany them to therapy. The primary outcome measure was the Glasgow Depression Scale (GDS-LD). Secondary outcomes included carer ratings of depressive symptoms and aggressiveness, self-report of anxiety symptoms, social support, activity and adaptive behaviour, relationships, quality of life and life events, and resource and medication use.

**Results:** 161 participants were randomised (BeatIt 84; StepUp 77). Participant retention was strong, with 141 completing the trial. Most completed therapy (86% BeatIt, 82% StepUp). At baseline, 66% of StepUp and 63% of BeatIt participants were prescribed antidepressants. There was no statistically significant difference between the StepUp (12.94) and BeatIt (11.91) groups on GDS-LD scores at the 12 month primary outcome point. However, there were statistically significant within group reductions in both arms of the study at 12 months (-4.20 for BeatIt and -4.46 for StepUp). Reductions occurred between baseline and four month follow-up, immediately following therapy, with no changes between four and 12 months. Other psychological and quality of life outcomes followed a similar pattern. There was no economic evidence suggesting that BeatIt may be more cost-effective than StepUp. However, treatment costs for both groups were only approximately 4—6.5% of the total support costs. Results of the qualitative research with participants, supporters, and therapists were in concert with the quantitative findings. Both treatments were perceived as active interventions and were valued in terms of their structure, content, and perceived impact.

**Discussion:** Primary and secondary outcomes, economic data, and qualitative results all clearly demonstrate that there was no evidence that BeatIt was more effective than StepUp. However, all data sources are consistent with a conclusion that both BeatIt and StepUp were active and associated with improvements in outcomes. There is an absence of accessible psycho-social interventions for adults with learning disabilities who are depressed. Having two manualised approaches, which professionals working in community learning disability teams can be trained to deliver, could help address this significant health inequality.

**References/Citations:**